The University of Jordan School of Engineering

| | | | | | School o | f En | gineering | | | | | |
|--|--|---|---|---------------|----------------------|---------|----------------------------|-----------|---------|--|--|--|
| Department | | | | | Course Name | | Course Number | S | emester | | | |
| Mec | Mechanical Engineering | | | Project | (2) for mechanica | 1 | 0974599 | | | | | |
| | | | | <u> </u> | engineer | | | | | | | |
| | | | | 201 | 19 Course Catalo | og De | scription | | | | | |
| | | | | | | | y), write a comprehensive | | | | | |
| | the format posted on the department web site. The report should include, where applicable, economical and environmental assessments. The project work is presented by the students to an examination panel who judge the work. | | | | | | | | | | | |
| | | | | " | Instruct | | | | | | | |
| All Final Year Projects' Supervisors | | | | | | | | | | | | |
| References | | | | | | | | | | | | |
| Books | | | | | | | | | | | | |
| Journal Internet | Final Vea | nal Vaar Braigat Jaurmal | | | | | | | | | | |
| | | | | | | | | | | | | |
| Prerequisites Prerequisites by topic 5 th year level (Successfully completed 120 credit hours). | | | | | | | | | | | | |
| Prerequ | | | Project (1) for mechanical engineer 0974598 | | | | | | | | | |
| Co-requ | isites by | course | | | | | | | | | | |
| Prerequ | isite for | | | | | | | | | | | |
| | Topics Covered | | | | | | | | | | | |
| Week | | Topics | | | | | | | | | | |
| | | inar (1): Technical writing for reports (1) | | | | | | | | | | |
| | | Seminar (2): Scheduling of the projects over time | | | | | | | | | | |
| | Semin | ar (3): Fina | al Yea | r Project iss | ues | | | | | | | |
| | Mapping of Course Outcomes to ABET Student Outcomes | | | | | | | | | | | |
| SOs | | Course Outcomes | | | | | | | | | | |
| 1 | + | ability to propose engineering solutions to the project problem | | | | | | | | | | |
| 2 | | bility to document the work in logical sequence with good technical content accuracy and engineering | | | | | | | | | | |
| | | undness | | | | | | | | | | |
| 3 | 3. A | Ability to present results with: analysis, interpretation, sample calculation, error and trend analysis | | | | | | | | | | |
| 4 | | | | | | | | | | | | |
| | 5. A | | | | | | | | | | | |
| 5 | 6. A | | | | | | | | | | | |
| | 7. A | bility to wo | ork and | d perform as | a team member | | | | | | | |
| 6 | 8. A | bility to sta | ite spe | cific conclus | sions point out dire | ections | or actions to be taken for | future wo | ork | | | |
| | 9. A | bility to pe | rform | literature re | view and data colle | ection | | | | | | |
| 7 | 10. A | bility to un | dersta | nd the signit | ficance of the work | and p | project outcomes | | | | | |
| | ' | | | - | Evaluat | ion | | | | | | |
| H | | | | | Linual | | | 1 | | | | |

Expected Due Date

Assessment Tools

Weight

| Senior Design Project (1) Reports | | | | End of 1 | 20 | | | | | | | | |
|--|--|------------------------------|-----------------------------|-----------|----------------------------|---------------|--------------------|---|---------------------|--|--|--|--|
| (Evaluated by the Supervisor) Senior Design Project (1) Progress | | | | End of 1 | 10 | | | | | | | | |
| Report (Evaluated by the committee) Senior Design Project (2) Reports | | | | | 20 | | | | | | | | |
| (Evaluated by the Supervisor) | | | | End of 1 | 5 | | | | | | | | |
| | Format Adherence Committee | | | | End of the second semester | | | | | | | | |
| Exa | Examination Committee Evaluation | | | | End of the second semester | | | | | | | | |
| Pres | Presentation Committee Evaluation | | | | End of the second semester | | | | | | | | |
| Post | Poster | | | | the second se | emester | | | 10 | | | | |
| | | Cor | tribution (| of Cou | rse to Mee | t the Profe | ssional Compo | nents | | | | | |
| | | | | | | | | | | | | | |
| | Relationship to Student Outcomes | | | | | | | | | | | | |
| | SOs 1 | | 2 | | 3 | 4 | 5 | 6 | 7 | | | | |
| Ava | Availability X X | | | | X | X | X | X | X | | | | |
| | Relationship to Mechanical Engineering Program Objectives (MEPOs) MEPO1 MEPO2 MEPO3 MEPO4 MEPO5 | | | | | | | | | | | | |
| | MEPO1 MEPO | | | 2 WIEI OS | | | MEFO4 | | WIET 03 | | | | |
| ABET Student Outcomes (SOs) | | | | | | | | | | | | | |
| 1 | | | | | | | | | | | | | |
| 2 | An ability to apply engineering design to produce solutions that meet specified needs with consideration of public | | | | | | | | | | | | |
| | health, safety, and welfare, as well as global, cultural, social, environmental, and economic factors | | | | | | | | | | | | |
| 3 | An ability to communicate effectively with a range of audiences | | | | | | | | | | | | |
| 4 | An ability to recognize ethical and professional responsibilities in engineering situations and make informed | | | | | | | | | | | | |
| | judgments, which must consider the impact of engineering solutions in global, economic, environmental, and | | | | | | | | | | | | |
| | 1 0 | | | | _ | | | societal contexts An ability to function effectively on a team whose members together provide leadership, create a collaborative and | | | | | |
| 5 | societal o | contexts | | n a team | n whose men | nhers togethe | er nrovide leaders | hin create | a collaborative and | | | | |
| 5 | societal o | contexts | effectively or | | | • | • | ship, create | a collaborative and | | | | |
| 5 | societal of An abilit inclusive | y to function e environment, | effectively of establish go | oals, pla | ın tasks, and | meet objecti | ives | | a collaborative and | | | | |
| | Societal of An abilit inclusive An abilit | y to function e environment, | effectively on establish go | oals, pla | ın tasks, and | meet objecti | ives | | | | | | |

Updated by ABET Committee, 2021